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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/727,043

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EXAMINER

TOTH, KAREN E

ART UNIT

PAPER NUMBER

3735

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

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Office Action Summary	Application No. 10/727,043	Applicant(s) TANABE ET AL.	
	Examiner Karen E. Toth	Art Unit 3735	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 January 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-3,5-8,12,14,16 and 18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-3,5-8,12,14,16 and 18 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claim Rejections - 35 USC § 103

2. Claims 1-3, 5, 6, 12, and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ogura (US Patent Application Publication 2003/0167014) in view of Utsugi (US Patent Application Publication 2001/0056228) and Kodama (US Patent Application Publication 2003/0013988).

Regarding claim 1, Ogura discloses an apparatus comprising a pulse wave detection device (elements 36, 54); a device for processing the detected pulse wave (elements 32, 96); a device for measuring blood pressure (elements 16, 86); and a display unit (elements 79, 98). The pulse wave processing device is used to determine characteristic points of the detected pulse wave, calculate characteristic parameters, and calculate an index of a pulse wave reflection from said parameters (paragraphs [0005], [0065]). The display unit may be used to show (figure 11; paragraph [0074]) the calculated index on one axis of a 2-D graph ("AI") and the measured blood pressure on a second axis ("BLOOD PRESSURE (mmHg)").

Utsugi teaches a communication network for health systems that is used to bring local results into contact with outside storage, databases, and users (Figures 1, 3, and 4). The communication network is also used to allow a

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prescription data processing section to communicate with the subject, so that prescriptions may be displayed in response to the subject's physiological measurements in order to reduce the amount of time between testing and diagnosis.

Kodama teaches a system that uses measurements of physiological parameters (steps S42, S43, S44) to make treatment and therapy recommendations (step S45) that are displayed with a mark (figure 11), in order to ensure that the user identifies and understands the recommended treatment.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have made the apparatus of Ogura with the prescription data processing section of Utsugi as part of the communication network in order to allow prescriptions to be determined and rapidly displayed to a user, and displayed the prescriptions with a mark, as taught by Kodama, in order to ensure that the user identifies and understands the recommended treatment.

Regarding claim 2, Ogura further discloses that the characteristic points used to determine the index are peak points of the traveling and reflected pressure pulse waves, and that the index is a ratio of the amplitude of the wave components at those peak points (paragraph [0065]).

Regarding Claim 3, Ogura further discloses that the index may be a measure of time between a component of the traveling wave and component of the reflected wave (paragraphs [005], [0065]).

Regarding claims 5 and 6, Ogura further discloses that the index comprises an augmentation index (paragraph [0005]), and that the computation

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unit may adjust the calculated index based on the subject's pulse (paragraph [0069]).

Regarding claim 12, Ogura discloses an apparatus comprising a pulse wave detection device (elements 36, 54); a device for processing the detected pulse wave (elements 32, 96); and a display unit (elements 79, 98). The pulse wave processing device is used to calculate a plurality of indices from the pulse wave (paragraphs [0005], [0065]). The display unit may be used to show the correlation between indices on a 2-dimensional graph (figure 11; paragraph [0074]).

Utsugi teaches a communication network for health systems that is used to bring local results into contact with outside storage, databases, and users (Figures 1, 3, and 4). The communication network is also used to allow a prescription data processing section to communicate with the subject, so that prescriptions may be displayed in response to the subject's physiological measurements in order to reduce the amount of time between testing and diagnosis.

Kodama teaches a system that uses measurements of physiological parameters (steps S42, S43, S44) to make treatment and therapy recommendations (step S45) that are displayed with a mark (figure 11), in order to ensure that the user identifies and understands the recommended treatment.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have made the system of Ogura with the prescription data processing section of Utsugi as part of the communication network in order to

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reduce the amount of time between testing and diagnosis; and displayed the prescriptions with a mark, as taught by Kodama, in order to ensure that the user identifies and understands the recommended treatment.

Regarding Claim 14, Ogura further discloses that said apparatus may be used to measure blood pressure (paragraph [0060]), and that the blood pressure measurement may be displayed on the display (as shown in figure 11).

3. Claims 7 and 8 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ogura in view of Utsugi and Kodama, as applied to claims 1, 3, 12, and 14 above, and further in view of Hatschek (US Patent 5309916).

Regarding Claim 7, Ogura in view of Utsugi and Kodama discloses all the elements of the current invention, as applied to Claim 3 above, except for the index comprising the time difference between the starting point of an ejection wave and the starting point of a reflection wave (ΔT_P).

Hatschek teaches measuring the difference in phase between an ejection wave and a reflected wave (column 7, lines 51-56) in order to measure the velocity of the pressure pulse wave (column 8, lines 16-20) so that a more clear status of the patient's condition may be determined. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have formed the apparatus of Ogura in view of Utsugi and Kodama with the index comprising the time difference between the starting points of the ejection and reflection waves, as taught by Hatschek, in order to more clearly determine the status of the patient's condition.

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Regarding Claim 8, Ogura further discloses that the pulse wave velocity may be adjusted for the height of the patient (paragraphs [0054], [0064]).

4. Claims 16 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ogura in view of Utsugi and Kodama, as applied to claims 1, 3, 12, and 14 above, and further in view of Tanaka (US Patent Application Publication 2004/0077960).

Regarding claim 16, Ogura in view of Utsugi and Kodama discloses all the elements of the current invention, as described above, and further discloses that the device comprises a central processing unit (CPU) (elements 32, 76) that is used to store the physiological data to memory for future retrieval (paragraphs [0072], [0095]). Ogura does not disclose the memory unit storing the data in chronological order.

Tanaka teaches a device for measurement of physiological signals comprising a memory device that stores said signals in chronological order (paragraph [0035]), in order to more easily store and retrieve the data. It would have been obvious to one of ordinary skill in the art at the time the invention was made to have formed the device of Ogura in view of Utsugi and Kodama with the chronological memory storage of Tanaka, in order to more easily store and retrieve the data.

Regarding claim 18, Ogura further discloses the display unit (element 79) may be used to display data stored in the CPU (paragraphs [0072], [0095]).

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Response to Arguments

5. Applicant's arguments with respect to claims 1-3, 5-8, 12, 14, 16, and 18 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Karen E. Toth whose telephone number is 571-272-6824. The examiner can normally be reached on Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Charles Marmor, II can be reached on 571-272-4730. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



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